Method for producing optically active alcohols or carboxylic acids

Abstract:

- The present invention relates to a process for preparing optically active hydroxy-, alkoxy-, amino-, alkyl-, aryl- or chlorine-substituted alcohols or hydroxy carboxylic acids having from 3 to 25 carbon atoms or their acid derivatives or cyclization products by hydrogenating the correspondingly substituted optically active mono- or dicarboxylic acids or their acid derivatives in the presence of a catalyst whose active component consists of rhenium or of rhenium and comprises at least one further element having an atomic number of from 22 to 83, with the provisos that
 - a. the at least one further element having an atomic number of from 22 to 83 is not ruthenium and
- b. in the case of the preparation of optically active 2-amino-, 2-chloro-, 2-hydroxy-and 2-alkoxy-1-alkanols by catalytically hydrogenating corresponding optically active 2-aminocarboxylic acids, 2-chlorocarboxylic acids, 2-hydroxycarboxylic acids and 2-alkoxycarboxylic acids or their acid derivatives, the at least one further element having an atomic number of from 22 to 83 is not palladium or platinum.